Tax Expenditures for Health Care

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OTA Paper 38

April 1979

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Washington, D.C. 20220
Issued: April 1979

* The authors are members of the Office of Tax Analysis and Office of the Assistant Secretary for Economic Policy, respectively. They are indebted to Charles Clotfelter, Joshua Greene, Clark Havighurst, Michael Kaufman, Bridger Mitchell, Benjamin Okner, Charles Phelps, Floyd Reeves, and Emil Sunley for their helpful comments and to Amie Powell for her assistance in the preparation of the manuscript.

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TAX EXPENDITURES FOR HEALTH CARE

I. INTRODUCTION

Because of the renewed interest in proposals to provide for National Health Insurance, and because of increased concern over the rising cost of medical care to both individuals and the government, much recent research has focused on equity and efficiency aspects of direct expenditure programs to provide medical care. Yet the Federal Government also helps individuals finance the purchase of medical care through substantial tax subsidies. Over \$11 billion of Federal income tax expenditures are provided currently through the exclusion or deduction from the income tax base of payments for certain medical expenses, including premiums for insurance. 1/ These tax expenditures are the principal programs of government assistance for the purchase of medical care by the non-aged, non-poor population.

This paper does not treat other indirect tax subsidies such as deductions for charitable contributions to health or medical institutions, tax exemption of interest on hospital bonds, expensing of removal of architectural and transportation barriers to the handicapped, and the non-taxability of social security and public assistance payments for medical care.

Specifically, the tax system subsidizes the purchase of medical care by means of provisions permitting (1) employer contributions for health insurance premiums or other medical payments for employees to be excluded from taxable income; 2/ and (2) certain medical expenses to be deducted from adjusted gross income on individual income tax returns. In general, payments by employers for medical insurance or other medical care of employees are deducted as a cost of business; at the same time, these payments are excludable from the gross income of employees. In addition, individuals are allowed itemized deductions for 50 percent of the amount paid for health insurance premiums, up to a maximum of \$150, and for other medical care expenses (including the remaining amount of health insurance premiums) which exceed three percent of the taxpayer's adjusted gross income (AGI). Expenditures for drugs and medicines may be counted in this three percent floor only to the extent that they separately exceed one percent of AGI.

This paper will examine these tax expenditures, their impact on the Federal budget and their effects on price and demand for medical care. Section II provides a brief history

^{2/} In this paper, the terms "exclusion" or "employee exclusion" will be used as an abbreviated reference to the exclusion from taxation by employees of employer contributions to health plans.

of tax law changes leading to the present exclusion and deduction. Section III presents estimates of revenue loss from these tax expenditures and some evidence on their increasing cost over time. Section IV then analyzes the distributional impact of these expenditures. Effects of the taxation of medical expenditures on the demand and price of medical care are discussed in Section V, while some policy alternatives are detailed in Section VI. Finally, a summary is contained in Section VII.

II. HISTORY OF MEDICAL EXCLUSIONS AND DEDUCTIONS

Although the exclusion from individual income taxation of payments to employer-provided group plans has existed effectively since the adoption of the income tax, the rationale for that exemption has varied over time. At first, most fringe benefits of employees were not taxed -- non-cash compensation was not widely recognized as income. Of course, before World War II, the income tax did not affect the majority of workers, and assignment of value of fringe benefits would have served little purpose in the case of non-taxable workers. Moreover, a few decades ago, benefit payments under group health insurance were much smaller relative to income, both because a smaller proportion of income was spent on medical care and because more private payments were made by individuals or through individual, rather than group, polic-Internal Revenue Service rulings 3/ eventually ies. supported the exclusion by declaring that the premiums paid by an employer to a group insurance medical policy were not taxable to the employee.

In later years, however, it came be to recognized that in-kind compensation was a form of wages which could be

^{3/} Special Ruling, October 26, 1943, 433CCH, Federal Tax Service par. 6587.

subject to tax. By 1953, IRS rulings had become somewhat inconsistent. While employer payments on group policies remained nontaxable to employees, employer-paid premiums on individual policies were deemed to be income subject to tax.

4/ In the 1954 Code, Congress decided to make the exclusion uniform, and all contributions to accident or health insurance plans have since been allowed an exclusion from income by the employee.

The tax treatment of medical expenses paid by individuals (rather than by employers) has evolved differently. No deduction for medical expenses existed until 1942. During World War II, substantial numbers of citizens were brought under the income tax and tax burdens were raised significantly; it was felt that some relief from this heavier tax burden should be granted to taxpayers with extraordinary medical expenses. Consequently, deductions were allowed for medical expenses exceeding five percent of net income, with a maximum deduction of \$2,500 for families. The maximum deduction was raised several times and finally eliminated in 1965.

Changes were also made in the five percent floor. The 1951 Act and subsequent provisions effectively eliminated any floor for the medical expenses of the aged or for taxpayers

^{4/} Rev. Rul. 210, CB 1953-2, p. 114

taking care of aged dependent parents. However, in 1965 the Social Security Amendments provided substantial amounts of medical care for the aged and at the same time required all taxpayers, including the aged, again to be subject to the same floor for itemized medical deductions. 5/

In 1954, another major change was made when the five percent floor (by now based on adjusted gross income) was lowered to three percent, and an additional one percent floor was applied to expenses for drugs before those expenses could be counted toward the overall three percent floor. A major justification for both actions was that deductions should be allowed for all "extraordinary" expenses. While a five percent floor was considered too high to cover all extraordinary expenses, a one percent floor was considered necessary to exclude ordinary drug expenses.

Besides the one percent floor on drugs, another separate calculation was required when the Social Security Amendments of 1965 allowed a deduction for part of the expenses of insurance policies without regard to the overall floor. 6/

 $[\]overline{5}$ / The change was made effective beginning in 1967.

 $[\]frac{6}{P}$ A deduction was allowed for one-half of insurance premiums, not to exceed \$150. Any remaining insurance premiums were to be subject to the three percent floor.

The rationale for this allowance was that the normal deduction favored those who could self-insure against variable expenses, while those who stabilized their outlays through purchase of insurance would be less likely to benefit from the deduction.

In 1978, the Carter Administration proposed that medical and casualty losses be deductible only to the extent that, when combined, they exceeded ten percent of adjusted gross income. All medical expenses, including health insurance premiums and drug expenses would be subject to this same floor. Thus there would be no separate allowance for half of insurance premiums nor would there be a separate one percent floor for drugs. The House of Representatives accepted the simplification aspects of this proposal, but the suggested ten percent floor was kept at three percent, and casualty losses were not folded into the medical deduction. The Senate rejected the House provision and no change was made in the final Act. 7/

While the floor for itemized medical expenditures has declined to three percent and remained there for over two decades, the proportion of income spent on medical

 $[\]overline{7/}$ The Revenue Act of 1978.

expenditures has risen. Table 1 shows health expenditures from 1950 to 1976 and compares this data to adjusted gross income of households. During this period, total health expenditures, both public and private, 8/ have risen from 5.9 percent to 12.6 percent of adjusted gross income, $\underline{9}$ / while private expenditures have risen from 4.5 percent to around 7 percent. What at one time may have been an extraordinary expenditure may now be only ordinary. In fact, this increase in percent of income spent on health expenditures was a major argument for the Carter Administration's proposal to increase the floor on combined medical and casualty deductions to ten percent. Other arguments related to the small percentage (about 25 percent) of taxpayers benefitting from the medical deduction, and to the simplification possible if fewer taxpayers were required to maintain medical records. Opponents of the change, on the other hand, argued that it would be unfair to raise the floor at a time when medical expenses were becoming more burdensome. Apparently, Congress, in maintaining the three percent floor, has shifted

^{8/} For estimates of total public and private health expenditures, see Gibson and Fisher (1978).

^{9/} As a percent of GNP, health expenditures are about nine percent.

Table 1

Year	:: Health Expend	tures 1/	::Adjusted :: :: Gross ::	Health Expendi a Percentage	
	:: Total Public : :: and Private :	_		Total Public : and Private :	Private
	(\$ billio	ons)		
1950	12.0	9.0	202.1	5.9	4.5
1955	17.3	12.9	273.9	6.3	4.7
1960	25.9	19.5	346.1	7.5	5.6
1965	38.9	29.4	466.4	8.3	6.3
1966	42.1	31.3	508.9	8.3	6.2
1967	47.9	32.0	541.6	8.8	5.9
1968	53.8	33.7	595.6	9.0	5.7
1969	60.6	37.7	644.7	9.4	5.8
1970	69.2	43.8	677.3	10.2	6.5
1971	77.2	48.4	719.9	10.7	6.7
1972	86.7	53.2	793.2	10.9	6.7
1973	95.4	58.7	887.5	10.7	6.6
1974	106.3	64.8	963.1	11.0	6.7
1975	123.7	71.3	1,008.3	12.3	7.1
1976	141.0	80.8	1,118.7	12.6	7.2

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^{1/} Health expenditure estimates are for fiscal years. Source: Gibson and Fisher (1978).

^{2/} Source: U.S. Department of Commerce, Bureau of Economic Analysis.

from a standard which allowed deductions for "extraordinary" expenditures to one in which deductions are allowed for expenses which are more than a "moderate" proportion of income. This shift makes the personal deduction more consistent with the employer exclusion in which all payments for medical expenses or insurance are non-taxable to the employee.

III. REVENUE COST OF TAX EXPENDITURES FOR HEALTH: 1968 - 1979

For fiscal 1979, Federal income tax expenditures for health care will be over \$11 billion. Seventy-four percent of this total is for the employee exclusion of employer contributions, while 26 percent is for individual deductions. These tax expenditures cover about 5 percent of total public and private health care expenditures and about 9 percent of private expenditures. Like Medicare and Medicaid, these subsidies are non-taxable and are of even more value to individuals than an equivalent increase in before-tax income.

The tax expenditure estimate of \$11 billion relates to the Federal income tax alone. There is a further tax expenditure cost of about \$2 billion to States with income taxes. In addition, social security tax revenues are reduced by about another \$4 billion, although this revenue reduction does not properly constitute a tax expenditure. 10/ In total, Federal and State revenues are reduced by about \$17 billion because of these tax expenditures.

^{10/} Since social security operates at least in part as an insurance scheme, the reduced taxes are reflected in reduced benefit payments later.

Most workers currently benefit from the exclusion of employer payments. According to the latest data from the Social Security Administration (Yohalem, 1975), in 1975 about 58.2 million workers or 72 percent of all wage and salary workers, were covered by some type of health care insurance financed by employer-paid premiums.

Treasury estimates show the Federal income tax expenditure cost of this exclusion to have grown from \$1.1 billion in 1968 to \$8.3 billion in 1979, or at a rate of about 20 percent a year. (See Table 2). While changes in the Treasury method of estimation do not allow exact comparisons, there clearly was a sharp rise in lost revenue during these years. This rise can be traced primarily to two factors: (1) the increase in cost of medical insurance, and (2) the growth in use of nontaxable fringe benefits as a means of payment for work. The increased use of insurance may itself have led to increased costs of medical care, in turn raising the cost of medical insurance. And, although there may have been increased use of group insurance policies in absence of the exclusion, there is little doubt that the exclusion acts as an incentive for workers and employers to receive their compensation in non-taxable health benefits rather than taxable wages. Since the government pays part of the cost through reduced tax collections, the employee faces

a lower after-tax price for his health insurance. The employer may also share in this benefit since he can provide an increase in after-tax compensation more cheaply through extra insurance than through direct wages.

Compared to the exclusion, fewer taxpayers benefit from the itemized deduction of medical expenses on individual income tax returns. Still, by 1978, 20 million tax returns are estimated to have claimed itemized deductions of \$14.4 billion for medical care expenses. The estimated revenue cost of this tax expenditure has grown from about \$1.5 billion in 1968 to \$2.9 billion in 1979 or at a rate of about 7 percent per year. This lower growth rate for the deduction -- as compared to the exclusion -- can be traced to two principal factors (besides changes in methods of estimation). First, the increased use of employer-provided insurance over these years has meant that a lower proportion of total medical expenditures were being paid out-of-pocket. the size of the standard deduction (currently called the "zero bracket amount") has increased greatly during this For instance, for joint returns before 1970, the minimum amount of the standard deduction was \$200, plus \$100 for each exemption 11/ (other than age and blindness).

 $[\]frac{11}{\text{percent}}$ Or, for certain taxpayers, the deduction equaled 10 percent of adjusted gross income, if greater.

1979, the minimum amount (and the maximum amount) of zero bracket amount (standard deduction) for joint returns had risen to \$3,400, regardless of income, and the number of taxpayers itemizing deductions had fallen correspondingly.

Table 2

Major * Federal Income Tax Expenditures for Health Care
(\$ millions)

Fiscal	:	Exclusion of Employer :	Deductibility of	•
Year	:	Contributions for Medical:	Medical Expenses	
	:	Insurance Premiums and :	Individual Incom-	
	:	Medical Care :	Tax Returns	:
1979		8,255	2,890	11,145
1978		7,105	2,785	9,890
19.77		5,560	2,556	8,116
1976		4,490	2,315	6,805
1975		3,275	2,315	5,590
1974		2,940	2,125	5,065
1973		2,500	1,900	4,400
1972		2,000	1,900	3,900
1971		1,450	1,700	3,150
1970		1,450	1,700	3,150
1969		1,400	1,600	3,000
1968		1,100	1,500	2,600
		·		
Average	An	nual		
Growth	Ra	te (20 %)	(7%)	(13 %)
			-	•

^{*/} Excludes deductibility of charitable contributions (health), tax exemption of interest on hospital bonds, expensing of removal of architectural and transportation barriers to the handicapped, and non-taxability of social security and public assistance payments for medical care.

IV DISTRIBUTION OF TAX EXPENDITURES BY INCOME CLASS

Table 3 shows the latest Treasury estimates of the distribution among income classes of tax expenditures from the exclusion of employer payments for health care. The numbers are highly tentative and are based upon some simple assumptions about the distribution of employer-provided health insurance among employees. Because marginal tax rates are higher in higher income classes, a dollar of tax-free health insurance is worth more (i.e., the tax expenditure cost is greater) to taxpayers at higher income levels. Below tax-exempt levels of income, of course, there is no employee gain from the tax expenditure.

Table 3

Distribution of Tax Expenditure for Employer Payments for Health Care Fiscal Year 1977

Expaned Income Class (\$000)	<pre>: Tax Expenditure : (\$ millions)</pre>	**********
	(1	
0 - 5	\$ 91	
5 - 10	494	
10 - 15 15 - 20	814	
	1,028	
20 - 30	1,547	
30 - 50 50 - 100	882	
	456	
	178	
200 and over	<u>70</u>	
TOTAL	\$ 5,560	

Source: U.S. Treasury Department. Information is contained in a news release from Senator Muskie's Office, "Muskie News" (February, 1978), Appendix, p. 4.

By using a 50,000 sample of individual tax returns and the Treasury Tax Model, the distribution of tax expenditure benefits can be determined with more detail and accuracy for itemized deductions. Table 4 demonstrates that the average tax expenditure per return with itemized medical deductions increases as income increases (column 9). This increase is the result of several factors, including higher marginal tax rates and greater medical expenditures at higher income levels. Moreover, if the average tax expenditure is calculated across all taxpayers in the income class, rather than just itemizers, the tax expenditure is still of greater expected value in higher income classes (column 6).

It is somewhat surprising that the regressiveness of the deduction is not tempered more by the 3 percent floor which applies to most itemized medical expenses. A percentage floor decreases the probability that a high income person can itemize medical expenses in excess of the floor. For instance, a person with \$20,000 of adjusted gross income can itemize expenses (subject to the floor) in excess of \$600, while a person with \$100,000 of adjusted gross income can itemize expenses only in excess of \$3,000. However, while increases in income do reduce the probability of itemizing deductions in excess of the floor, the average deduction increases significantly in higher income classes (column 13).

Table 4

PERSONAL DEDUCTION FOR MEDICAL EXPENSES

--Tax Expenditures and Deductions by Expanded Income Class-- (1978 Law and 1978 Levels of Income)

Statement Stat		(7) :: :: :: :: :: :: :: :: :: :: :: :: ::	e le et	g verage Tax	:: (10) : (11) :: ::Returns Itemizing 1/2::1 ::of Insurance Premiums:: ::	nizing 1/2::Re Premiums::	(12) : eturns Item Excess of : Number :	:: (10) : (11) :: (12) : (13) ::Returns Itemizing 1/2::Returns Itemizing Expenses in ::of Insurance Premiums:: Excess of 3 Percent Floor :: : : : : : : : : : : : : : : : : : :
\$ (a) 341 \$2.052 \$ 33 \$263 \$126 \$2.057 10 1,910 1,208 9 1,593 1120 1,239 1,239 42 3,421 832 114 2,934 121 2,600 958 42 3,951 659 123 3,403 119 2,590 848 40 5,889 574 137 5,325 119 3,133 877 105 3,515 511 174 3,319 121 1,318 1,059 187 867 153 123 123 123 1,059 188 1,500 1,500 1,500 1,500 1,500 1,500 189 1,500 1,500 1,500 1,500 1,500 1,500 1,500 18 1,500 1,500 1,500 1,500 1,500 1,500 1,500 1,500 1,500 18 1,500 1,500 1,500 <t< th=""><th><pre>:: Returns : Deductions :Expenditure :: ::(thousands):(\$ millions):(\$ millions):</pre></th><th>Deduction (\$)</th><th>of :Deduction</th><th>n: Expend- :iture (\$)</th><th>of : Returns :</th><th>ion</th><th>of Returns :</th><th>Deduction (\$)</th></t<>	<pre>:: Returns : Deductions :Expenditure :: ::(thousands):(\$ millions):(\$ millions):</pre>	Deduction (\$)	of :Deduction	n: Expend- :iture (\$)	of : Returns :	ion	of Returns :	Deduction (\$)
10 1,910 1,208 98 1,593 120 1,708 28 3,421 832 114 2,934 121 2,600 42 3,951 659 123 3,403 119 2,590 62 5,889 574 137 5,325 119 2,590 105 3,515 511 174 3,319 12,318 1,318 187 643 309 829 129 205 189 1,163 666 157 134 21 501 1,500 919 41 123 21 5 13 20,101 5,145 17,865 5,121 11,903 5	23,019 \$ 700 \$ 11	0 \$			263	\$ 126	325	\$ 2,057
28 3,421 832 114 2,934 121 2,600 42 3,951 659 123 3,403 119 2,590 62 5,889 574 137 5,325 119 3,133 105 3,515 511 174 3,319 121 1,318 1,318 187 643 309 829 129 205 2, 365 1,163 666 157 134 21 7, 5 13 1,500 919 41 123 11,903 81, 5 13 20,101 5 179 17,865 5 121 11,903 81,	19,158 2,307 188			86	1,593	120	1,708	1,239
42 3,951 659 123 3,403 119 2,590 62 5,889 574 137 5,325 119 3,133 105 3,515 511 174 3,319 121 1,318 1,318 187 867 643 309 829 129 205 2, 365 1,163 666 157 134 21 7, 5 13 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$ 1,	14,099 2,845 388			114	2,934	121	2,600	958
62 5,889 574 137 5,325 119 3,133 105 3,515 511 174 3,319 121 1,318 187 867 643 309 829 129 205 365 1,163 666 157 134 21 5.1 1,500 919 41 123 21 \$.33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$	11,609 2,602 485			123	3,403	119	2,590	848
105 3,515 511 174 3,319 121 1,318 187 867 643 309 829 129 205 365 1,163 666 157 134 21 501 42 1,500 919 41 123 21 \$ 33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$	12,970 3,383 807			137	5,325	119	3,133	877
187 867 643 309 829 129 205 365 163 1,163 666 157 134 21 501 42 1,500 919 41 123 33 \$ 33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$	5,838 1,798 613			174	3,319	121	1,318	1,059
365 163 1,163 666 157 134 21 501 42 1,500 919 41 123 3 \$ 33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$	1,429 558 268			309	829	129	205	2,204
501 42 1,500 919 41 123 3 \$. 33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903 \$	190 109			999	157	134	21	7,908
\$ 33 20,101 \$ 719 \$ 145 17,865 \$ 121 11,903	78 63 39	1	·	919	41	123	3	16,642
	88,499 \$14,447 \$2,908		v	\$ 1/5	17 865	\$ 121	11,903	\$ 1,033

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March 14, 1979

In fact, the increase is so large that the average deduction across all returns — itemizers and nonitemizers alike — still increases with income (column 5). This result may occur because of significant price and income elasticities of demand, a greater ability of high-income persons to actually pay off large medical bills, increased amounts of self-insurance as income rises, or a combination of all these factors. Whatever the cause, the effect of the medical deduction on tax liabilities is a regressive redistribution of tax burdens. 12/

^{12/} The liability effect is clearly regressive. However, the incidence effect may be different and can depend upon such factors as political feedbacks. See Buchanin and Pauly (1970).

V. EFFECT OF TAX EXPENDITURES FOR HEALTH ON THE DEMAND AND PRICE OF MEDICAL CARE

Generally, employers are indifferent between a dollar paid in the form of a fringe benefit and a dollar paid as a cash wage. Both amount to a dollar of cost to the employer, and both are tax deductible as ordinary and necessary costs of doing business.

However, to the employee, income paid in the form of cash wages is fully taxable, whereas income in the form of employer-paid health insurance premiums is exempted from Federal income tax, State income tax and social security tax. Thus, employees are inclined to accept a larger share of their compensation in the form of health insurance than they would if the income in-kind was taxable. As Section III indicated, this has contributed to the growth in the use of the employer exclusion.

Since the exclusion provision reduces the price employees must pay for health insurance, 13/ it is also likely to increase the demand for health insurance; improved

^{13/} A further consequence of the exclusion is the inducement for groups to be employer based, rather than to form around other organizations. Employees with employer-based group health insurance are often faced with the loss of their health insurance if they lose or change their job. Thus, these employees may be vulnerable to increase health insurance costs at a time when they can least afford it.

insurance coverage in turn increases the demand for health care. Improved coverage may be reflected in a reduction of the deductible amount, a reduction of the coinsurance amount 14/ or inclusion of previously uncovered services. Since tax rates are higher in higher income brackets, the price reduction -- and the price incentive to increase the quantity of services demanded -- increases with income.

The effect of allowing itemized deductions for health care expenses may be analyzed along the same lines. The deduction for health insurance premiums has much the same effect as the exclusion: it reduces the after-tax price of health insurance or health care, and the reduction is of greater value at higher income levels. The major difference is that the exclusion is available regardless of whether the taxpayer itemizes deductions or takes the standard deduction, whereas the personal deduction for health insurance premiums must be itemized. For the majority of taxpayers who do not itemize, there is no price reduction.

The requirement that medical expenses exceed three percent of AGI before qualifying as a deduction (except for 50 percent of health insurance premiums up to \$150) is

^{14/} The "coinsurance" or "copayment" amount is the percentage of the total bill (after any deductible that might apply) which must be paid by the insured person.

similar to a deductible clause in an insurance policy (Mitchell and Vogel, 1975). Customarily, private insurance deductibles are specified in dollar terms (e.g., \$100 per year per family member) rather than as a percentage of income. Specifying the deductible as a percentage of income results in a higher deductible amount at higher income levels. Of course, the smaller the deductible, the larger the share paid by the government.

According to Newhouse, et. al. (1974) a small deductible (e.g., between \$50 and \$100 per year, per family) should have little effect on the demand for hospitalization; i.e., the effect of insurance would be about the same with or without such a deductible. The cost of an average hospital stay cost was about \$1,000 in 1975 (and has increased since then) and, thus, would easily exceed a small deductible.

For ambulatory and other non-hospital services, however, a moderate size deductible is likely to influence demand markedly. As the authors point out, the median individual visits a physician about twice a year at a cost of about \$40. At this level of cost, there is a good chance that the recipient of medical care would pay the cost out-of-pocket because the deductible would not be exceeded.

While the three percent floor is roughly analogous to a deductible in an insurance policy, the exclusion of employer premiums and the deduction of all expenses above three percent are both analogous to a copayment rate. The marginal tax rate determines the proportion of the last dollar of medical expense paid by the government; thus, the copayment rate equals one minus the taxpayer's marginal tax rate.

Again, the tax incentive for increased use of medical services is greater the higher the taxpayer's taxable income.

The exact effect of these tax subsidies on the overall demand for health services is thus based in large part upon the subsidy rate on marginal expenditures. As noted, on average the Federal income tax expenditures of about \$11 billion alone cover approximately 9 percent of total private expenditures for health care. At the margin, however, the reduction in price is much greater than 9 percent. The marginal price reduction is equal to the taxpayers' marginal tax rate — about 22 percent for the average employee and about 25 percent for the average itemizer. If we also take into account State income taxes and social security taxes, the price reduction climbs to about 29 percent for itemizers and 35 percent for employees. 15/ Since demand is based

^{15/} This example assumes that the incidence of the employee portion of social security taxes falls on the employee, while, for the employer portion, the incidence rests half on the employee and half on the employer.

primarily upon marginal price, the impact of the tax expenditures upon the demand of medical services is greater than the price reduction averaged across all expenditures would indicate.

Whether increased demand for medical services will actually lead to an increase in the quantity purchased will depend primarly upon the elasticities 16/ of demand and supply. In general, the more elastic either supply or demand, the more likely will the tax subsidy increase the amount of medical care provided in the economy. Often the demand for health care is viewed to be inelastic. However, elasticity at the margin maybe higher for controllable expenses or non-catastrophic events than for uncontrollable or catastrophic occurances. That is, demand for some minimal health care or insurance maybe inelastic, but the demand for additional health care or insurance may be much more elastic.

Because tax subsidies act to increase the demand for medical care, they also tend to increase its market price. A subsidy creates a wedge between the market price received by

<u>16</u>/ The elasticity of demand (or supply) may be defined roughly as the tendency of demand (or supply) for medical goods to change as the price of those goods changes. More precisely, the elasticity of Y with respect to X is the percentage change in Y that accompanies a percentage change in X.

the seller and the net cost to the buyer. Increases in price result in the tax subsidy (or the wedge) being shared with the providers of medical care; thus, the greater the increase in market price, the less the tax subsidy reduces the net cost of medical care to taxpayers.

Generally, the more inelastic the demand for medical care, the lower is the increase in market price as a proportion of the subsidy. On the other hand, to the extent that supply is inelastic, the opposite case holds: tax subsidies are reflected more in increases in price. Insurance complicates considerably the demand side of the medical marketplace. Phelps (1976b) argues that the demand for health insurance is relatively elastic (compared to most estimates of the demand for medical care). Tax subsidies then lead to increased insurance coverage, and increased coverage, in turn, leads to lower copayment rates on medical goods actually purchased. Newhouse (1978) suggests that, once a large proportion of the population faces trivially small copayment rates, the demand side of the market ceases to exert an independent restraint on the market, and medical care price changes, over time, are determined by events exogenous to normal market operations.

In any case, while the tax subsidies may be intended to subsidize only the demanders of health care, in fact, both the demanders and providers are subsidized. To make matters worse, market price increases probably apply fairly uniformly to many types of purchase of medical care, while the value of the tax subsidies increases with the taxpayer's income. Thus, even if the tax subsidy results in a net price (after subsidy) decrease to the average taxpayer, it may still result in a net price increase for low- and moderate-income taxpayers who receive only a small price subsidy. 17/ For those who do not receive any subsidy, a net price increase is almost certain.

^{17/} A similar argument with respect to the exclusion from taxable income of net imputed rent of owner-occupied homes, together with the personal deduction of mortgage interest and property taxes, has been made by Schreiber (1978). Homeowners with low marginal tax rates may actually pay higher prices net of tax due to the existing tax deduction.

VI. Policy Alternatives

The tax treatment of medical expenses can be changed both directly by legal changes in the exclusion and deduction, and indirectly through changes in other health programs. This section discusses briefly some commonly proposed changes in health policy as they affect tax expenditures for health care.

Limitation of the Exclusion of Employer Contributions.

One commonly suggested policy alternative is to treat some or all employer contributions as income to employees. Revenue gain from such a change might then be available for direct Federal expenditures for medical care, e.g., national health insurance. If employees include as income all employer payments for health care and insurance, some personal deduction might be maintained; in that case, the value of employer-provided health insurance and other employer payments for health care would be added to other personal medical expenditures and would be subject to the same limitation or floor (e.g., the current 3 percent AGI limitation) that applies to those expenditures.

Whether the treatment of employer payments as taxable income can be justified depends in part upon the principle of equity under which the income tax base is defined. Under

current law, the implied principle underlying the employee exclusion of employer payments is that the base for individual income taxation should be exclusive of all medical expenses. Under this principle, equal income status is defined as equal ability to purchase non-medical goods; if all medical expenses are viewed as both unwanted and unavoidable, then the well-being of a person can be approximated by his income after payment of all medical expenses. Thus employer payments of medical insurance and care are excluded from income subject to tax.

Inclusion of employer payments, on the other hand, would result in a consistent rule being applied to all medical payments, no matter whether they were paid by the employer or by the taxpayer. If a floor for itemizations were maintained, the implied principle of the current exclusion of employer payments would be abandoned in favor of a principle of deductibility that only "extraordinary" deductions should be allowed.

In addition to considerations of tax equity and revenue loss, other arguments to limit the exclusion are based upon the objective of improving the efficiency and competitiveness of the medical care market. More economical — less wasteful — coverage might be gained by requiring employer paid health plans to meet certain standards to qualify for the exclusion.

And the standards might be designed to give employees more choice and, hence, more of an economic incentive to choose less costly plans (Enthoven, 1979).

Including employer payments in income would require some arbitrary administrative rules. Because employees vary in occupation and age, there are market differentials in the prices that they face for private insurance. To charge them equally for employer-provided insurance may not always reflect the relative market value of the insurance that they receive, although similar valuation problems apply as well to other taxable fringe benefits. Alternatively, to calculate the value of the insurance for each employee separately would impose additional administrative burdens upon employers. final alternative of disallowing the exclusion to the employer, i.e., making the payments taxable to the employer, would also bring about a unfavorable result, for the employer's expense is clearly a cost of doing business, and the employer's marginal tax rate is not a good proxy for the employee's marginal tax rate.

Changing Deduction Floors. Tax expenditures could be decreased or increased by changing the floor for itemized deductions. An increased floor seems to be in line with a measure of ability to pay which allows adjustments to income

only for extraordinary or above average medical expenses. As noted in Section II, the proportion of individuals' incomes spent on medical expenditures has increased in recent years. Taken as a percent of total adjusted gross income, both total and private expenditures for medical care have risen, and this is the primary rationale usually given for increasing the floor. Increasing the floor for medical deductions from three to ten percent and folding in the separate allowance for one-half of insurance premiums, 18/ as proposed in 1978, would have decreased the number of taxpayers itemizing medical expenses by over 80 percent.

On the other hand, as already noted, the inherent logic of the current employee exclusion of employer payments implies that a deduction should be allowed to all taxpayers for all medical expenses. To carry that logic to its extreme would require both elimination of the floor and an allowance for medical deductions to taxpayers who do not itemize. Following the same logic to a lesser extent, a case can be made for not increasing the floor if the employee exclusion is not changed. The higher the floor, the greater is the relative tax on those who buy their own insurance or self-insure and do not receive insurance through an employer.

¹⁸/ Casualty losses were also folded into the medical deduction under this proposal.

The question of self-insurance deserves mention in this The allowance of a separate deduction for half of context. insurance expenses (up to \$150) was enacted in 1965 partly because of objections from the insurance industry that the deductible amount or floor gave individuals an incentive to Since medical expenditures varied, it was self-insure. argued, a person would be more likely to have expenses above the floor in some years if he did not even out the expenditures over the years through insurance. 19/ The adoption of a higher floor would also reduce the tax benefit of those who self-insure since, at least in certain expenditure ranges, no tax subsidy would be available. Additionally, if individuals are risk averse and risk aversion increases with the size of the risk, then it is less likely that individuals will self-insure for extraordinary expenses than for ordinary expenses. Thus, with a higher floor, not only would fewer non-insured expenses be subsidized, but there may be fewer individuals who would be willing to self-insure for the expenses that remained eligible for the subsidy.

^{19/} The merit of this argument is debatable. At least for very high medical expenses, only the very wealthy can realistically self-insure. Since most families have a strong incentive to purchase insurance for catastrophic events, and most taxpayers do not itemize, repeal of the separate deduction may have little impact on insurance coverage.

Converting the Personal Deduction to a Personal Credit. A credit could be offered against medical expenses, and the current deduction could be eliminated (or allowed only for expenses in excess of the credit). Depending on the extent to which the credit covers costs, such a proposal could be designed as part of a program of national health insurance, or it could be much more limited in scope. In some national health insurance schemes, the credit serves as a device to provide catastrophic coverage, while other coverage is provided through other means.

Converting the deduction to a credit implies a change in the purpose to which the tax expenditure is directed. A deduction is allowed primarily to define the tax base, i.e., to classify individuals with equal ability to pay taxes. Thus, a taxpayer with \$25,000 of income and \$5,000 of deductible medical expenses is treated as having equal ability to pay as a taxpayer with \$20,000 of income and no deductible medical expenses, all other things being equal. At the same time, since the value of a deduction increases with income, it provides a greater price subsidy to those at higher income levels. A credit, on the other hand, may be viewed as a payment from the government to subsidize the cost of some item -- in this case, medical care -- rather than to adjust the measure of income subject to tax. A credit usually provides an equal level of price subsidy for all

subsidized expenditures at various income levels and marginal tax rates. 20/ Because the purpose of the credit is usually unrelated to the goal of defining the tax base, it is often designed to be available to taxpayers who do not itemize and to nontaxable persons, 21/ as well.

The cost (i.e., revenue loss) of a credit would depend upon the type of proposal that is made. Assume that a personal credit is adopted in lieu of the personal deduction, that there is no increase in price of or demand for health care, and that a credit is available for all private medical expenses. Each one percent of credit would then cost about \$1 billion in 1978, with an offset of around \$150 million due to the elimination of the current tax expenditure for personal deductions and a reduction in the use of employer-provided insurance.

To lessen the cost of a credit, both a deductible amount and a copayment rate could be applied to the credit. These

^{20/} Thus we have such terms as "refundable tax credits," even though there is no tax against which the credits are taken. In effect a refundable tax credit is an expenditure administered along with the income tax.

^{21/} Sunley (1977) argues that, if one could separate involuntary and voluntary medical expenses, then one might want to allow a deduction for involuntary expenses since they reduce ability to pay, but to credit (subsidize) the voluntary expenses.

changes would not only lead to a decrease in the cost of the credit, but they also would limit the increase in demand caused by the government subsidization of health care.

To target a credit most to those in need, a deductible amount should be based on income. 22/ Thus, as with the current medical deduction, only expenses in excess of a given percentage of income would be eligible for the credit. alternative to a variable deductible amount is a flat deductible amount. A flat deductible, however, is not well targeted to those most in need of assistance, nor does it take into account that demand may increase somewhat with Moreover, parameters in the Tax Code are not indexed income. for increases in income, whether real or inflationary. Over time, a credit with a fixed dollar deductible could lead to a larger and larger proportion of total medical expenses being paid out of public funds. Assuming more than pure inflationary growth in the total amount of medical expenditures, an increase in public share would occur even with a flat dollar deductible indexed for inflation.

^{22/} One result of varying the deductible with income is that, for certain persons there is an implicit tax rate on increased earnings due to the increase in the amount of expenses not eligible for the credit. For instance, if the credit were to equal 100 percent of all expenses in excess of 10 percent of adjusted gross income, thhen, for a person with \$1,500 in medical expenses and \$10,000 in adjusted gross income, an extra dollar of earnings reduces the credit by ten cents (from \$500 to \$499.90).

National Health Insurance. This paper is concerned with tax expenditures rather than national health insurance (NHI). However, adoption of a NHI plan would have substantial effects on existing tax expenditures for health care even without a change in the laws allowing the exclusion and the The principal change comes about because of the substitution of sources of payment for medical care. employer payments increase, so do tax expenditures due to the exclusion. If government payments substitute for employer payments, tax expenditures due to the exclusion go down. the other hand, increases in employer or government payments for medical care both may lead to decreases in direct payments by persons and, therefore, to decreases in the use of the itemized deduction for medical expense. Because the size of the tax expenditure for the employee exclusion is much larger than the tax expenditure due to the personal deduction, the change in total tax expenditures for most NHI proposals is primarily determined by the change in expenditures of employers.

Table 5 shows the change in tax expenditures and other changes in income tax collections due to adoption of selected prototype plans for national health insurance. Since the amount of direct patient payments decline in all cases, there

is a decrease in the use of the personal itemized deduction for medical expenses. Public plans which require increased employer payments raise the tax expenditure cost of the exclusion, while plans which primarily increase government payments decrease the amount of that exclusion.

Any NHI plan might be accompanied by any of the three previously mentioned options: elimination of the exclusion, disallowance of the deduction, or a credit in lieu of a deduction. To the extent that NHI replaces excludable employer payments, elimination of the employee exclusion of employer payments may not result in a large increase in taxable income. A proposal for eliminating the exclusion might properly be based on the argument that all extraordinary costs already would be covered by NHI and that tax-exempt NHI coverage would be approximately equal for all citizens. However, it would be inconsistent if taxable income would include payments for medical insurance and services from employers but not from the government. Furthermore, the problem of attributing the market value of employer-paid insurance premiums to each employee would remain.

Disallowing the itemized personal deduction might also be justified if national health insurance covered all

Table 5

Indirect Effect of National Health Insurance on Income Tax Collections

		ď	Prototype Plan		Tentative	Tentative Estimates			,
	Publicl	Publicly Guaranteed	:: Public Co	Public Corporation :	:	Target	:: Consumer	Choice	
Expenditure Source	:: Change In :: Expenditure	50	: Change In :: : Income Tax:: Change In :Collections::Expenditure:	: Change In : Income Tax: s:Collections:	Change In :: Income Tax:: Change In ollections::Expenditure	: Change In : Income Tax : S:Collections	: Change In ::	: Change In : Income Tax	× @
Insurance									1
Employer	+ 17.0	- 4.3	+ 24.0	- 6.0	- 5.0	+ 1.3	- 28.0	+ 7.0	
Employee	+ 0.5	•	+ 2.0	*	- 2.0	*	- 9.5	+ .2	
Private	- 5.0	+ .2	- 5.0	+ .2	- 2.0	+ .1	- 4.5	+ .2	
Other Employer	- 1.0	+	- 1.0	+	1	ł	- 0.5	+ .1	
Direct Patient Payment	+ 14.5	9· +	- 14.5	9· +	- 8.0	+	8.5	+	
<u>Federal</u>	- 29.0		+ 20:0	ŀ	+32.5	ŀ	+ 72.0	1	ł
Total	+ 26.0	- 3.2	+ 25.5	- 4.9	+15.5	+ 1.7	+ 21.0	+ 7.8	-37 I I
Addendum:	·							•	7 —
 If add employer tax credit of \$5 billion 	;	+81.3	· ·	+\$1.3	!	1		•	
- If increase excise taxes, increase employer payments to a payroll tax or add to a value added tax of \$5 billion	1	-\$1.3	1	-\$1.3	1	-\$1.3	1 · · · · · · · · · · · · · · · · · · ·	-\$1.3	/

^{*} Less than \$50 million

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extraordinary costs. Still, the more coverage provided by NHI, the less the possibility that out-of-pocket health expenditures would exceed three percent of adjusted gross income. Thus, while eliminating the deduction might be justified, the revenue effect is of less significance because fewer taxpayers would exceed the floor.

Finally, a tax credit might very well be the form in which insurance for catastrophic events is offered under NHI. Depending upon the size of the credit, the personal deduction might or might not be eliminated. If not eliminated, it would only be allowed for expenses in excess of those not covered by the credit. If the credit is large enough, however, there may be no cases in which expenses would exceed a floor, and, thus, no need for the deduction.

VII. CONCLUSION

Tax expenditures for medical care form a large and growing part of the Federal budget. Employer payments for medical care have always been exempted from income taxation, and an increasing proportion of total private medical payments are exempted from tax because of the increase in coverage provided by employers. The personal deduction was first allowed in 1942 and has been expanded since then to cover expenses which might be considered quite ordinary today.

For 1979 Federal income tax expenditures for medical care will exceed \$11 billion and will comprise about 5 percent of total expenditures for medical care and about 9 percent of private expenditures. State income tax and social security tax collections are also reduced by another \$6 billion. While not as large as direct expenditure programs such as Medicare and Medicaid, these tax expenditures do have an impact upon the demand and price of medical care. At the margin, these expenditures often reduce price by 29 to 35 percent.

Practically all policies connected with medical care affect the amount of tax expenditures for medical care.

Direct expenditures may change tax expenditures even if the laws affecting the exclusion and deduction are unchanged. The design and choice of tax expenditure policy is dependent upon the extent to which medical exclusions and deductions are to be made equally available to all persons, the amount of ordinary expenditures which are to be disallowed a deduction, and the extent to which other public expenditures are used to offset costs of health care.

BIBLIOGRAPHY

- [1] Buchanin, James M. and Pauly, Mark V. "On the Incidence of Tax Deductibility," National Tax Journal 23 (June, 1970): 157-167.
- [2] Davis, Karen. "National Health Insurance." In Setting National Priorities -- The 1975 Budget. Ed. by Blechman, Barry McGramlich, Edward M.; and Hartman, Robert W., Washington: The Brookings Institution, 1974.
- [3] Davis, Karen and Schoen, Cathy.
 on Poverty: A Ten-Year Appraisal.
 Brookings Institution, 1978.

 Health and the War
 Washington,: The
- [4] Enthoven, A. "Recommended Low-Cost Changes to Existing laws to Enhance Competition Among Health Care Financing and Delivery Plans." Unpublished note (February, 1979).
- [5] Feldstein, Martin S. "The Welfare Loss of Excess Health Insurance." <u>Journal of Political Economy</u> 81 (March-April, 1973): 251-281.
- [6] Gibson, Robert M. and Fisher, Charles R. "National Health Expenditures, Fiscal Year 1977. Social Security Bulletin 41 (July, 1978): 3-20.
- [7] Havighurst, Clark C. "Controlling Health Care Costs: Strengthening the Private Sector's Hand." Journal of Health Politics, Policy and Law. 1(Winter, 1977): 471-498.
- [8] Mitchell, Bridger M. and Phelps, Charles E.

 "National Health Insurance: Some Costs and Effects of
 Mandated Employee Coverage." Journal of Political
 Economy 84 (1976): 553-571.
- [9] Mitchell, Bridger M. and Schwartz, W. "The Financing of National Health Insurance." Science 192 (May, 1976).
- [10] Mitchell, Bridger M. and Vogel, Ronald J. "Health and Taxes: An Assessment of the Medical Deduction." Southern Economic Journal. XLI(April, 1975): 660-672.

- [11] Newhouse, Joseph P. "The Erosion of the Medical Marketplace." Prepared under a grant from the Department of Health, Education and Welfare. Santa Monica: The RAND Corporation, 1978.
- [12] Newhouse, J.; Phelps, C.; and Schwartz W. "Policy Options and the Impact of National Health Insurance."

 New England Journal of Medicine (June, 1974).
- [13] Phelps, Charles E. "The Demand for Reimbursement Insurance." In <u>The Role of Health Insurance in the Health Services Sector.</u> Ed. by Rosett, Richard N. New York: National Bureau of Economic Research, 1976b.
- [14] Phelps, Charles E. "Some Implications of Catastrophic Health Insurance." Unpublished paper. Santa Monica: RAND Corporation, January, 1976a.
- [15] Schreiber, Chanoch "Inequality in the Tax Treatment of Owner-Occupied Homes," National Tax Journal XXXI (March, 1978): 101-104
- [16] Sunley, Emil M. "The Choice Between Deductions and Credits." National Tax Journal 30 (September, 1977): 243-247.
- [17] U.S. Treasury Department. "Tax Expenditures Affecting Individuals, Fiscal Year 1977," "Muskie News" (February 13, 1978). Appendix to
- [18] Yohalem, Martha Remoy "Employee Benefit Plans, 1975." Social Security Bulletin 40 (November, 1977): 19-27.